UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/573,839	03/29/2006	Tomoya Nakatani	Q94075	5127

23373 7590 03/30/2011

SUGHRUE MION, PLLC
2100 PENNSYLVANIA AVENUE, N.W.
SUITE 800
WASHINGTON, DC 20037

EXAMINER	
BOHATY, ANDREW K	
ART UNIT	PAPER NUMBER
1786	

NOTIFICATION DATE	DELIVERY MODE
03/30/2011	ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

sughrue@sughrue.com
PPROCESSING@SUGHRUE.COM
USPTO@SUGHRUE.COM

Office Action Summary	Application No.	Applicant(s)	
	10/573,839	NAKATANI ET AL.	
	Examiner	Art Unit	
	Andrew K. Bohaty	1786	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE *3* MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *17 March 2011*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1,7,9,10 and 15-27* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1,7,9,10 and 15-27* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☒ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☒ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☐ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date *2011/03/17*.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

DETAILED ACTION

Continued Examination Under 37 CFR 1.114

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on March 17, 2011 has been entered.

2. This Office action is in response to the amendment filed March 17, 2011, which amends claims 1, 7, and 9 and cancels claims 4-6 and 8. Claims 1, 7, 9, 10, and 15-27 are pending.

Response to Amendment

3. Applicant's amendment of the claims and cancellation of the claims, filed March 17, 2011, has caused the withdrawal of the rejection of claims 1, 4-10, and 15-27 under 35 U.S.C. 103(a) as being unpatentable over Oguma et al. (EP 1344788) as set forth in the Office action mailed October 19, 2010.

4. Applicant's amendment of the claims and cancellation of the claims, filed March 17, 2011, has caused the withdrawal of the provisional rejection of claims 4-6 and 8 on the ground of nonstatutory obviousness-type double patenting as being unpatentable over copending Application No. 10/532,937 (Doi et al.) (hereafter "Doi") in view of

applicant's admitted prior art (hereafter "AAPA") as set forth in the Office action mailed October 19, 2010.

Information Disclosure Statement

5. The reference US2002/0028347 in the IDS filed March 17, 2011, as not considered by the examiner because the reference was already made of record in the PTO-892 form mailed on May 27, 2009.

Specification

6. The title of the invention is not descriptive. A new title is required that is clearly indicative of the invention to which the claims are directed.

Double Patenting

7. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. A nonstatutory obviousness-type double patenting rejection is appropriate where the conflicting claims are not identical, but at least one examined application claim is not patentably distinct from the reference claim(s) because the examined application claim is either anticipated by, or would have been obvious over, the reference claim(s). See, e.g., *In re Berg*, 140 F.3d 1428, 46 USPQ2d 1226 (Fed. Cir. 1998); *In re Goodman*, 11 F.3d 1046, 29

USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

8. A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) or 1.321(d) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent either is shown to be commonly owned with this application, or claims an invention made as a result of activities undertaken within the scope of a joint research agreement.

9. Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

10. Claims 1, 7, 9, 10, and 15-27 are provisionally rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1-9, 23-26, and 28-30 of copending Application No. 10/532,937 (Doi et al.) (hereafter "Doi") in view of applicant's admitted prior art (hereafter "AAPA"). Although the conflicting claims are not identical, they significantly overlap in scope with the claims of copending Application No. 10/532,937. Both are directed to light emitting polymers, where one of the repeating units can be represent by applicant's formula (4).

11. Regarding claim 1 of the instant application, with respect to claims 1 and 3-6 of Doi, Doi claims a polymer light emitting material which contains a polymer compound

comprising a repeating unit of the following formula (1) and having a polystyrene-reduced number-average molecular weight of 10^3 to 10^8, Doi more specifically claims in claims 3-5 that repeating unit formula (1) can be represented by formula (4) where X is oxygen, this is same repeating unit that is claimed by the applicant. Furthermore, claim 6 of Doi allows the polymer to further comprise a repeating unit of applicant's formula (5)-(8). Therefore, it would have been obvious to one of ordinary skill in the art to incorporate dependent claims 3-6 of Doi into claim 1 of Doi, this would lead to practicing the instant invention.

12. Doi does not claim a polymer light emitting material which exhibits light emission from the triplet excited state.

13. In the specification Doi teaches a polymer light emitting material which exhibits light emission from the triplet excited state (paragraphs [0071] and [0079]-[0081]) to produce a new polymer compound having strong light emission strength (paragraph [0003]).

14. Given the teachings of Doi in the specification it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the polymer complex compound, of Doi, wherein the polymer light emitting material exhibits light emission from the triplet excited state to arrive at the claimed invention. One of ordinary skill in the art would have been motivated to produce a new polymer compound having strong light emission strength.

15. Regarding claim 7 of the instant application, with respect to claim 7 of Doi, claim 7 only differs from claim 7 of Doi for the same reasons claim 1 of the instant application

differs from claim 1 of Doi as described above. Therefore, claim 7 of Doi would be modified in the same obvious manner as claim 1 above to arrive at the claimed invention.

16. Regarding claim 9 of the instant application, with respect to claim 9 of Doi, claim 9 only differs from claim 9 of Doi for the same reasons claim 1 of the instant application differs from claim 1 of Doi as described above. Therefore, claim 9 of Doi would be modified in the same obvious manner as claim 1 above to arrive at the claimed invention.

17. Regarding claim 10 of the instant application, with respect to claim 23 of Doi, claim 10 only differs from claim 23 of Doi for the same reasons claim 1 of the instant application differs from claim 1 of Doi as described above. Therefore, claim 23 of Doi would be modified in the same obvious manner as claim 1 above to arrive at the claimed invention.

18. Regarding claim 15 of the instant application, with respect to claim 1 of Doi, claim 15 only differs from claim 1 of Doi for the same reasons claim 1 of the instant application differs from claim 1 of Doi as described above. Therefore, claim 1 of Doi would be modified in the same obvious manner as claim 1 above to arrive at the claimed invention.

19. Regarding claim 16 of the instant application, with respect to claim 24 of Doi, claim 16 only differs from claim 24 of Doi for the same reasons claim 1 of the instant application differs from claim 1 of Doi as described above. Therefore, claim 24 of Doi

would be modified in the same obvious manner as claim 1 above to arrive at the claimed invention.

20. Regarding claim 17, Doi does not claim the ink composition according to claim 16 having 1 to 100 mPa·s of viscosity at 25℃.

21. In the specification Doi teaches the ink composition according to claim 16 having 1 to 100 mPa·s of viscosity at 25℃ (paragraph [0250]) to produce a new polymer compound having strong light emission strength and a polymer light-emitting device using said polymer compound (paragraph [0003]).

22. Given the teachings of Doi in the specification it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the ink composition, of Doi, wherein the ink composition would have a viscosity of 1 to 100 mPa·s at 25℃ to arrive at the claimed invention. One of ordinary skill in the art would have been motivated to produce a new polymer compound having strong light emission strength and a polymer light-emitting device using said polymer compound.

23. Regarding claim 18 of the instant application, with respect to claim 25 of Doi, claim 18 only differs from claim 25 of Doi for the same reasons claim 1 of the instant application differs from claim 1 of Doi as described above. Therefore, claim 25 of Doi would be modified in the same obvious manner as claim 1 above to arrive at the claimed invention.

24. Regarding claim 19 of the instant application, with respect to claim 25 of Doi, claim 19 only differs from claim 25 of Doi for the same reasons claim 1 of the instant application differs from claim 1 of Doi as described above. Therefore, claim 25 of Doi

would be modified in the same obvious manner as claim 1 above to arrive at the claimed invention.

25. Regarding claim 20 of the instant application, with respect to claim 25 of Doi, claim 20 only differs from claim 25 of Doi for the same reasons claim 1 of the instant application differs from claim 1 of Doi as described above. Therefore, claim 25 of Doi would be modified in the same obvious manner as claim 1 above to arrive at the claimed invention.

26. Regarding claim 21 of the instant application, with respect to claim 26 of Doi, claim 21 only differs from claim 26 of Doi for the same reasons claim 1 of the instant application differs from claim 1 of Doi as described above. Therefore, claim 26 of Doi would be modified in the same obvious manner as claim 1 above to arrive at the claimed invention.

27. Regarding claim 22 of the instant application, with respect to claim 28 of Doi, claim 22 only differs from claim 28 of Doi for the same reasons claim 1 of the instant application differs from claim 1 of Doi as described above. Therefore, claim 28 of Doi would be modified in the same obvious manner as claim 1 above to arrive at the claimed invention.

28. Regarding claim 23 of the instant application, with respect to claim 29 of Doi, claim 23 only differs from claim 29 of Doi for the same reasons claim 1 of the instant application differs from claim 1 of Doi as described above. Therefore, claim 29 of Doi would be modified in the same obvious manner as claim 1 above to arrive at the claimed invention.

29. Regarding claim 24 of the instant application, with respect to claim 29 of Doi, claim 24 only differs from claim 29 of Doi for the same reasons claim 1 of the instant application differs from claim 1 of Doi as described above. Therefore, claim 29 of Doi would be modified in the same obvious manner as claim 1 above to arrive at the claimed invention.

30. Regarding claim 25 of the instant application, with respect to claim 29 of Doi, claim 25 only differs from claim 29 of Doi for the same reasons claim 1 of the instant application differs from claim 1 of Doi as described above. Therefore, claim 29 of Doi would be modified in the same obvious manner as claim 1 above to arrive at the claimed invention.

31. Regarding claim 26 of the instant application, with respect to claim 30 of Doi, claim 26 only differs from claim 30 of Doi for the same reasons claim 1 of the instant application differs from claim 1 of Doi as described above. Therefore, claim 30 of Doi would be modified in the same obvious manner as claim 1 above to arrive at the claimed invention.

32. Regarding claim 27, Doi does not claim an illumination comprising a polymer light emitting device according to any of claims 21 to 22.

33. In the specification Doi teaches an illumination comprising a polymer light emitting device according to any of claims 21 to 22 (paragraphs [0231] and [0295]-[0297]) to produce a new polymer compound having strong light emission strength and a polymer light-emitting device using said polymer compound (paragraph [0003]).

34. Given the teachings of Doi in the specification it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify a polymer light emitting device according to any of claims 21 to 22 to be used an illumination device to arrive at the claimed invention. One of ordinary skill in the art would have been motivated to produce a new polymer compound having strong light emission strength and a polymer light-emitting device using said polymer compound.

35. This is a provisional obviousness-type double patenting rejection because the conflicting claims have not in fact been patented.

Conclusion

36. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Andrew K. Bohaty whose telephone number is (571)270-1148. The examiner can normally be reached on Monday through Thursday 7:30 am to 5:00 pm EST and every other Friday from 7:30 am to 4 pm EST.

37. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, D. Lawrence Tarazano can be reached on (571)272-1515. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

38. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/A. K. B./
Andrew K. Bohaty
Patent Examiner, Art Unit 1786

/D. Lawrence Tarazano/
Supervisory Patent Examiner, Art Unit 1786